Project Name:		Date:		Climate Zone:

TDV for the Standard Design Building, See Reference Nonresidential Appendix NA5.2

Occupancy Type and Coefficients Tables   ☐ Nonresidential, See Table NA5-3   ☐ 24-Hour Use, See Table NA5-4   ☐ Retail, See Table NA5-5

A	B	C	D	E	F	G	H	I	J	K	L	M
									Coefficients for[9]			
						Criteria			U-factor	SHGC	VT	
Assembly Type[1]	Orientation	Number Of Like Assembly Type[4]	Roofs or Floor Mass Type[5]	Exterior Surface Area	Fenetration Type	U-factor[6]	SHGC[7]	VT[8]	$Cs_{u,i}$	$Cs_{s,i}$	$Cs_{t,i}$	Standard TDV Energy[10]
									Sum of Total Standard Design			

1.Indicate type of assembly for the Envelope (e.g. Wall, Floor, Roof, Window, Skylight & Door). One assembly type for each row.

2.Enter the area of each different assembly.

3.Enter the type of fenestration; M=Manufactured, SB=Site-built, SK= Skylight and F=Fabricated.

4.Grouping of like assemblies in the same orientation is allowed. Iindicate the number in column E.

5.Enter Roofs, Floors, Walls,and for Mass Walls the catergories are light mass(HC<7), medium mass (7<=HC,15), and heavy mass (HC>=15).

6.Standard Design U-factor are from Table 143-A, B or C.

7.Standard Design SHGC are from Table 143-A, B or C. Enter "0" if not applicable for each skylight. Note: Not all vertical windows have an overhang then assume SHGC as value entered.

8.To calculate the fenestration standard design VT in Column I. Multiply Column H by 1.2.

9. Coefficients for; U-factor ($Cs_{u,i}$), SHGC ($Cs_{s,i}$), and VT($Cs_{t,I}$ can be found in Table NA5.2, through Table NA5.5 of the Reference Nonresidential Appendices NA5. The Coefficient for SHGC and VT are only enter

   for the **fenestration products**. Enter "0" when not applicable.

10. Calculate the TDV Standard Design for for each Envelope Assembly Type: TDV_{Std} = Column C x [Column E x ((U-factor$_{Si}$ x C_{Sui}) + ($SHGC_{Si}$ x C_{Ssi}) + (VT_{Si} x C_{Sti}))] for each Assembly Type. See Nonresidential Manual Examples in Section 3.7.1 for details.